



# Immunize Utah

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Utah Department of Health Immunization Program

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## Pre-filling and Pre-assembling Vaccine Syringes

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**D**uring the recent 2004 influenza vaccine shortage, the practice of pre-drawing/pre-filling vaccine and storing syringes came into question. In an effort to save time and to accommodate mass vaccination clinics, some providers have routinely "pre-assembled" pre-filled syringes and/or pre-filled vaccine in preparation for an upcoming clinic. Several hundred doses of influenza vaccine in Utah were lost this flu season due to this practice.

The Centers for Disease Control and Prevention (CDC) strongly discourages filling syringes in advance because this increases the risk for administration errors. Once in the syringe, it may be difficult to determine the type of vaccine, if more than one vaccine is used during clinic times.

Pre-filling syringes can lead to vaccine wastage, since unused pre-filled syringes must be discarded at the end of the clinic day. Syringes (other than

those filled by the manufacturers) are designed for immediate administration and NOT for vaccine storage.

Additionally, pre-filling syringes may result in bacterial growth in vaccines that don't contain preservatives

(such as vaccines supplied in single-dose vials).

Assembling "pre-filled" syringes is also strongly discouraged. Once the cap on the needle hub is removed, contamination could occur because the

sterile seal has been broken. The vaccine only has a one-day shelf life, once assembled. Any syringes that had needles attached to them must be discarded at the end of the clinic day, just as if the vaccine had been drawn into a syringe from a vial. According to the CDC, pre-filled syringes should NOT be removed from their packaging or have the needles attached until immediately before use.

The following is from Dr. Greg Wallace, CDC, regarding the practice of pre-filling syringes:

*"We do not endorse the practice of pre-filling syringes. There is no data to suggest that this practice ensures the safety and efficacy of the product and there are reasons to think that it does not. As guidance, CDC states that if vaccine is pre-filled in syringes, it needs to be administered by the end of the clinic day."*

In accordance with the CDC recommendations, the Utah Immunization Program has never endorsed pre-filling/drawing syringes, and we are requiring that this practice be stopped with any publicly funded vaccine.

For more information regarding the practice of pre-filling, call the Utah Immunization Program at (801) 538-9450 or go to [www.cdc.gov/nip](http://www.cdc.gov/nip).

### IMPORTANT NOTICE:

Please do not discard the Merck shipping containers until you have verified that the diluent for the vaccine has also been received. The diluent may be located in an enclosed area within the lid of the shipping container.

### Inside this Issue

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# Adolescent Immunization News!

**Nasrin Zandkarimi, M.Ed., P.N.**  
**Adolescent & Ethnic Outreach Coordinator**  
**Utah Immunization Program**

**The** need to protect our children doesn't end when they enter kindergarten. Many adolescents are susceptible to vaccine-preventable diseases, including varicella, hepatitis B, measles, and rubella. To improve vaccination coverage and increase immunization awareness among adolescents, the Utah Immunization Program has developed a new adolescent immunization campaign, "Got Vaxed?." Beginning January 2005, "Got Vaxed?" print materials will be available to public and private immunization providers and will include a teen immunization brochure, two posters, immunization reminder notepad for providers, and bookmarks. VFC providers, look for samples of these materials in the mail soon!

The Utah Immunization Program is also piloting a school-based adolescent immunization initiative, "Vaccinate Before You Graduate," in the Salt Lake City and Jordan School Districts. "Vaccinate Before You Graduate" provides a convenient resource for parents and teens in Utah middle and high schools about the importance of vaccinating teens before graduating from school.

As many providers and parents know, getting teens to a provider for vaccinations can be challenging. "Vaccinate Before You Graduate" can assist schools in providing information and getting teens caught up on their shots while in school and before getting a job, going to college, or traveling abroad. Some participating schools will be conducting immunization clinics on site.

The "Vaccinate Before You Graduate" program is modeled after a similar initiative developed by the Rhode Island Department of Health, Immunization Program. Available print materials include a poster, brochure and postcard. Future plans include developing additional print materials and expanding the program to schools statewide.

Thanks to the Salt Lake City and Jordan School District nurses, high school and middle school staff,

volunteers and the PTA for your collaboration in implementing this program.

If you are interested in participating in the "Vaccinate Before You Graduate" program or would like to order "Got Vaxed?" materials, contact the Utah Immunization Program at (801) 538-9450.

## Fast Facts on Adolescent Immunizations

- ◆ High rates of hepatitis A infection occur among children and adolescents 5 to 14 years old who live in some parts of the United States, and most cases can be attributed to person-to-person transmission.
- ◆ The majority of the estimated 78,000 new cases of hepatitis B reported each year strike adolescents and young adults. The hepatitis B virus is 100 times more infectious than HIV, the virus that causes AIDS.



become infected without knowing how they got the disease.

- ◆ Hepatitis B can be spread by sharing needles or razors; through intimate contact; and by tattooing or body piercing with unsterile equipment. But, nearly one-third of teens
- ◆ The tetanus/diphtheria booster is recommended at 11-12 years of age, if at least 5 years have elapsed since the last dose of tetanus and diphtheria toxoid-containing vaccine.

## Kudos To Providers!



The Utah Immunization Program is proud to recognize outstanding efforts in immunizing Utah's adolescents. We are pleased to recognize the following Intermountain Health Care (IHC) providers for rates achieved during recent immunization assessments in 2004 using the Adolescent Clinic Assessment Software Application (ACASA).

For achieving the goal of immunizing 80% or above of adolescents with 3 Hepatitis B, 2 MMR, and 1 Varicella:

### Budge Clinic, Logan

Timothy Anderson	Dennis Odell
Nordell Brown	Stephen Schneider
Derrel Clarke	Michael Visick
Prasula Garg	

### Cottonwood Pediatrics, Murray

Mark Barrett	David Hurley
Barbara Bean	Terry O'Mura
Julia Brogli	John Wall
William Cosgrove	Paul Wirkus
	Joseph Cramer

### Granger Clinic, West Jordan

Craig Brasher	Kristin Lynch
Dale Chapman	Bruce Montgomerie
Alyson Eyre	Mary Jane Pennington
David Harris	L. Harper Randall
Reid Harrison	Virginia Vierra

### IHC McKay Dee Pediatrics, Ogden

Donna Barhorst  
King Hom  
Maggie Hull  
Brett Sharp  
Catherine Stokes

### Mountain View Pediatrics, Sandy

Margaret Dodds	Richard Jackson
David Folland	Mitzi Schmidt
Kim Gehle	Richard Strong
Julie Gustin	

### Ogden Clinic

Edward Brown

### Parkway Pediatrics, Riverton

Tucker Davis  
Jimmy Ryan

### Pediatric Care of Provo

Marsena Conner  
Ronald Jones

### Rose Pediatrics, Ogden

A. Patrick Rose

### Utah Valley Pediatrics, American Fork

Gordon Glade  
Ryan Wilcox

### Utah Valley Pediatrics - Timpanogos, Orem

Jennifer Geary  
Melissa Kendall  
Gregory Wynn

### Wasatch Pediatrics - Willowcreek, Salt Lake

R. Dennis Ashton	Kathleen O'Mara
R. Joseph Jopling	Shellie Ring
	Steven Lynch



## Mark Your Calendars ! 2005 Events

### 39th National Immunization Conference

Washington Hilton and Towers, Washington, DC

March 21-24

### National Infant Immunization Awareness Week

April 24-30

### CDC Satellite Broadcasts & Webcasts

#### Epidemiology & Prevention of Vaccine Preventable Diseases

Session 1	February 17	10:00 - 1:30 pm
Session 2	February 24	10:00 - 1:30 pm
Session 3	March 3	10:00 - 1:30 pm
Session 4	March 10	10:00 - 1:30 pm

For more information regarding these broadcast to go :

<http://www.phppo.cdc.gov/phtnonline> or contact

Becky Ward at 801-538-9450.

Continuing education credits are offered for each broadcast.

# Managing the 2004 Flu Vaccine Shortage

**Carlie Shurtliff, BFA**  
**Adult Immunization Coordinator**  
**Utah Immunization Program**

**P**reparations for the 2004 influenza season started off with a high degree of uncertainty when Chiron, one of the flu vaccine manufacturers, identified lots of their flu vaccine that did not meet product sterility specifications. Subsequently, Chiron's license to manufacture the flu vaccine was suspended,



preventing the distribution of nearly half the nation's injectable vaccine supply for the 2004-2005 influenza season. To meet challenge, the Centers for Disease Control and Prevention (CDC) prioritized available vaccine

supplies to high-risk individuals and asked that distributors serve only those in the priority groups.

Approximately 61 million doses of the flu vaccine, including the injectable and nasal spray, were available for the 2004/2005 season. Aventis Pasteur, Inc. supplied 58 million doses. Unfortunately, this quantity is still well below last season's approximate 80 million available doses. In an attempt to further moderate this year's vaccine shortage, the Food and Drug Administration recently authorized the use of Fluarix under an Investigational New Drug application. The manufacturer, GlaxoSmithKline, will provide 1.2 million doses of the vaccine for distribution to areas most in need.

In spite of the national shortage, Utah has managed the season well. The majority of providers in Utah ordered through Aventis, putting our state in a much better position at the start. Additionally, the CDC and Aventis developed a distribution plan and strategic reserve to supply vaccine to providers who ordered from Chiron as well as Aventis. State and local health departments in Utah were among those to receive their full vaccine supply. This supply allowed public vaccine to be directed to providers serving high-priority populations such as hospitals, long

term care facilities, children 6-23 months of age, pregnant women and other high risk groups identified by the CDC.

Providers serving young children were minimally impacted by the shortage. Most of these Utah providers ordered the Aventis product, the only vaccine licensed for children less than 4 years of age. However, the flu vaccine ordered through the Vaccines for Children (VFC) Program was impacted by delays. Fortunately these delays were short-lived, and the Utah Immunization Program supplied VFC vaccine to providers as needed.

Overall, the impact of this vaccine shortage may have been slightly less severe in Utah than in other states. The cooperative efforts from the general public and providers to comply with interim recommendations, supply vaccine order information, and redistribute vaccine resulted in a much less difficult flu season than anticipated. Due to the great success of reaching most people in the priority groups, the Utah Department of Health lifted all flu vaccine restrictions on November 17<sup>th</sup>, allowing anyone to be immunized.

Utah has also experienced less influenza disease during the 2004-2005 influenza season. As of January 15, 2004, reported influenza disease is at very minimal levels with 390 cases. This sharply contrasts with the 2003-2004 season, when a nationwide influenza outbreak was at its peak during the second week of December 2003. A total of 1,204 influenza cases were reported last season.

Accessing "real time" online influenza information was a priority in light of the vaccine shortage. A new influenza website, <http://health.utah.gov/flu>, was developed this year through the cooperation of the Utah Immunization Program and the Bureau of Epidemiology. The website provides weekly updates and comparative graphs of disease activity, posts influenza press releases, provides contact links, and contains a wealth of information about flu vaccines, prevention strategies and influenza disease. Please take a few minutes to visit this website and bookmark it for regular use throughout the flu season.

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# Pertussis - Still a Cause for Concern

## Office of Epidemiology Utah Department of Health

Although pertussis (whooping cough) is often considered a disease of the past, it remains a significant concern globally, nationally and in Utah. By the end of November 2004, Utah reported 194 cases of pertussis, compared to 76 cases in 2003 and 47 in 2002 for the same time period. The Utah Department of Health, Office of Epidemiology, is evaluating whether the actual number of cases in Utah has increased due to a higher occurrence of pertussis or from an increase in testing and reporting.

*Bordetella pertussis* is highly infectious, infecting up to 90% of non-immune members of the same household. It is possible for one case of pertussis to generate up to 50 contacts, many of which require treatment. Transmission of pertussis is less likely by the time the patient has been coughing 2-3 weeks, but meanwhile, their contacts have been exposed at home, school, church and the workplace. With an incubation period of 6-21 days, pertussis spreads easily during the first two weeks of the disease when symptoms are most vague.

Pertussis causes disease in all age groups. However, young infants and children are at highest risk for this disease. Also, the clinical symptoms are most readily recognized in children. Disease is most significant in infants less than two months old, since vaccinations are not given before this age. The majority of hospitalizations from pertussis occur in this age group. Because the pertussis vaccine provides little or no protection five to ten years following the last dose, older children and adults become reservoirs for the disease.

Patients with clinical symptoms of pertussis and known exposure to a case may be treated presumptively. Otherwise, it is best to wait for a lab test to avoid the possibility of treating a viral infection with antibiotics. Prompt lab testing and treatment will limit spread of the disease. PCR is the recommended test for pertussis and a nasopharyngeal swab should be collected. Results are usually available

within 24 to 48 hours. Revised recommendations for treatment and prophylaxis of pertussis will be approved soon and announced by the Committee on Infectious Disease and the American Academy of Pediatrics.

### Pertussis Clinical Features

- ♦ **Catarrhal stage** - 1-2 weeks; common cold symptoms; early identification and testing is important; treatment of patients and contacts during this period effective in preventing outbreaks.
- ♦ **Paroxysmal (cough stage)** - 1-6 weeks; pertussis usually suspected during this stage; spasms of rapid coughing, followed by long inspiratory, high-pitched whoop; cyanosis and vomiting commonly follow the spasm. Attacks may occur up to 15 times in 24 hours.
- ♦ **Convalescent stage** - weeks to months; cough becomes less spasmodic and symptoms gradually disappear over 2-3 weeks; coughing episodes can continue up to 6 months after treatment.

**NOTE:** Any patient that complains of gasping or vomiting after a cough attack should be considered for laboratory testing for pertussis.

Currently, the pertussis vaccine is only licensed for children under the age of seven. The pertussis vaccine is fairly effective, but does not provide lifelong immunity. During the summer of 2004, two manufacturers applied for licensing of a new pertussis vaccine for adolescents and adults and may be available for use in 2005.

While cases of pertussis are significantly reduced from pre-vaccine levels, the disease still causes concern as a health problem. It is important to remain vigilant in identifying, treating and immunizing persons at risk for pertussis.

# Utah Pilots "Vaccinate and Vote" Campaign

**A**dvocacy has been a powerful tool for increasing infant and childhood immunizations. However, more outreach is needed to inform adults that immunizations are a lifetime commitment. In order to increase adult immunizations rates among targeted populations, the Utah Immunization Program conducted the first "Vaccinate and Vote" immunization campaign on Election Day, November 2, 2004. Utah was one of 15 grantees to receive funding from the Robert Wood Johnson Foundation for this type of pilot project.

On Election Day, community volunteers from local organizations and public health agencies combined



efforts to vaccinate voters at "Vaccinate and Vote" immunization clinics in Salt Lake and Weber counties. The clinics were set up at polling sites in districts where high disease rates and low immunization rates among older adults were identified. The Salt Lake clinic was held at the Northwest

Multi-Purpose Center in Rose Park and the Ogden clinic was held at the Wahlquist Jr. High School.

A total of 326 flu vaccinations were given to high-risk individuals. Due to the nationwide flu vaccine shortage, the flu vaccine was limited to the high-risk groups identified by the Centers for Disease Control for the 2004 flu season. However, other recommended adult vaccinations, such as the tetanus, pneumococcal, hepatitis A and hepatitis B were also available to adults 18 years of age and older.

Based on evaluations collected at the clinic sites, voters were pleased to have the convenience of fulfilling their civic responsibilities and getting vaccinated at the same location. Most voters agreed they would come to a polling site again for vaccinations.

Thanks to all the volunteers who helped make this a successful pilot project. A special thanks goes to the Utah Adult Immunization Coalition, Northern Utah Immunization Coalition, Community Nursing

Services and Salt Lake Aging and Adult Services, who provided nursing and technical staff. Through continued collaboration, we anticipate expanding the next "Vaccinate and Vote" campaign to additional areas throughout Utah. For more information on conducting a Vaccinate & Vote campaign, contact Rebecca Ward at (801) 538-6682.

## Did you know . . .

- ◆ Since 1900, the proportion of Americans age 65 and older has more than tripled. Life expectancy for men is now 73 years of age; for women, it is 80 years of age.
- ◆ Approximately half of the American voters are aged 50 or older.
- ◆ A flu shot is recommended for everyone 50 years of age and older.
- ◆ Only 36 percent of healthcare workers are immunized against influenza each year.
- ◆ As a result of contracting hepatitis A, an adult loses an average of one month of work.

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### **(Managing the 2004 Flu Vaccine Shortage)**

This year's developments highlighted the ongoing challenges in managing an "atypical" flu season. The positive side is that these challenges provided the health care community an opportunity to identify gaps and adapt plans quickly. One such gap that became readily apparent was the inability to quickly access vaccine ordering information and track flu vaccine usage. Identifying this problem led to more efficient communication among providers and state and local agencies to refine the process. Innovative mechanisms to manage flu season challenges, such as those we just experienced, prepare all of us for the bigger potential challenge that a flu pandemic would bring. The Utah Immunization Program appreciates the cooperation of all providers and individuals who helped make this flu season more manageable.

## More Kudos !



The Utah Immunization Program is proud to recognize outstanding efforts in immunizing Utah's children. We are pleased to recognize the following providers for rates shown during recent immunization assessments from October 2004 - December 2004 using the Clinic Assessment Software Application (CASA).

For achieving the goal of immunizing 90% of two-year-olds with 4 DTaP, 3 Polio, 1 MMR, 3 Hib, & 3 Hepatitis B:

A. Patrick Rose, MD  
Alpine Pediatrics  
Family Medical Center  
Granger Medical Clinic  
IHC Budge Clinic  
IHC McKay-Dee Pediatrics  
IHC Mountain View  
Louis Borgenicht, MD  
Ogden Clinic Pediatrics  
Parkway Pediatrics  
Pediatric Care - Pleasant Grove  
Pediatric Care - Provo  
Southwest Children's Clinic  
Utah Valley Pediatrics - American Fork  
Utah Valley Pediatrics - Timpanogos  
Willow Creek Pediatrics - St. Mark

For achieving the goal of immunizing 80% or more of two-year-olds with 4 DTaP, 3 Polio, 1 MMR, 3 Hib, & 3 Hepatitis B:

Alpine Pediatrics - Saratoga Springs  
Brigham Pediatrics  
Cottonwood Pediatrics  
Daniel A. Johnson, MD  
David C. Nuttal, MD  
Douglas R. Coombs, MD  
Foothill Family Clinic South  
Gary Behrmann, MD  
IHC Bountiful  
IHC Bryner  
IHC Cache Valley  
IHC Holladay Pediatrics  
IHC Sandy  
IHC Weipert Pediatrics

## Kudos Continued

For achieving the goal of immunizing 80% or more of two-year-olds with 4 DTaP, 3 Polio, 1 MMR, 3 Hib, & 3 Hepatitis B:

IHC West Jordan  
IHC Memorial  
IHC Vandenberghe Pediatrics  
Jeffrey Miles, MD, PC  
Jordan Valley Pediatrics  
Pediatric Care of Ogden  
Salt Lake Pediatric Center  
Smithfield Clinic  
St. Mark's Family Residency  
Utah Valley Pediatrics - Plaza  
Utah Valley Pediatrics - Provo University  
Wee Care Pediatrics  
Willow Creek Pediatrics



## Want to know more about immunization coalitions?

- ◆ Make a difference in Utah - get involved in one of Utah's immunization coalitions: *"Every Child By Two" Immunization Coalition*, *Utah Adult Immunization Coalition*, *Greater Salt Lake Immunization Coalition*, and the *Northern Utah Immunization Coalition*. For more information on how you can participate, contact **Rebecca L. Ward at 801 538-6682**.
- ◆ Join the National Immunization Coalition Technical Assistance Network. To join the Network, log on to: <http://surveymonkey.com/s.asp?u=48566604556>.
- ◆ Want more ideas on getting a coalition started? Check Out: *Healthy People in Healthy Communities: A Community Planning Guide Using Healthy People 2010*. (<http://www.healthypeople.gov/Publications/HealthyCommunities2001/toc.htm>).



Utah Department of Health

## IMMUNIZATION PROGRAM

Immunize for healthy lives

P.O. Box 142001  
288 North 1460 West  
Salt Lake City, UT 84114-2001

Return Service Requested



Check out our web-site!

[www.immunize-utah.org](http://www.immunize-utah.org)

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### Greetings from the new "Immunize Utah" editors, Rebecca Ward and Christine Perfili

Recently, the Utah Immunization Program has undergone a few changes, creating reassignments in staff responsibilities. The Utah Statewide Immunization Information System (USIIS) is integrating with the Utah Immunization Program. Christine Perfili, previous Marketing Manager for USIIS, has joined Rebecca Ward in the Education, Marketing and Outreach Team. We will be bringing you the latest news and issues regarding immunization and immunization registries. Thanks to Janel Jorgenson for creating and maintaining such a quality newsletter for the past four years. We look forward to

hearing from our readers about issues that are important to you. If you have questions or would like to share information, please contact us at 801 538-9450 or email us at [Rward@utah.gov](mailto:Rward@utah.gov) or [Cperfili@utah.gov](mailto:Cperfili@utah.gov).

